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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/622,194	07/18/2003	Alexander G. MacInnis	17414US03	4045

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MCANDREWS HELD & MALLOY, LTD  
500 WEST MADISON STREET  
SUITE 3400  
CHICAGO, IL 60661

EXAMINER
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BAUTISTA, XIOMARA L

ART UNIT	PAPER NUMBER
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2179

MAIL DATE	DELIVERY MODE
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07/09/2007

PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

## Office Action Summary

Application No.

10/622,194

Applicant(s)

MACINNIS ET AL.

Examiner

X. L. Bautista

Art Unit

2179

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 20 January 2004.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-20 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 18 July 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |   |   |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)  | 5) <input type="checkbox"/> Notice of Informal Patent Application                       |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date <u>See Continuation Sheet</u> . | 6) <input type="checkbox"/> Other: _____  |

Continuation of Attachment(s) 3). Information Disclosure Statement(s) (PTO/SB/08), Paper No(s)/Mail Date  
:7/18/03;1/20/04;6/8/04;6/24/04;8/9/04;12/14/04;1/25/05;7/18/05;8/29/05;1/20/06..

## DETAILED ACTION

### *Claim Rejections - 35 USC § 103*

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. **Claims 1-7, 9-17 and 19-20 are rejected under 35 U.S.C. 103(a) as being unpatentable over *Cottle et al* (US 6,263,396 B1) and *Dye* (US 6,108,014).**

#### Claims 1 and 11:

Cottle discloses a method and system having a window controller having the position of each window to be displayed; a plurality of windows can be overlapped and a priority encoder defines the display order on the screen (in a window controller, obtaining data that describes windows in which the graphics images are displayed; sorting the data using the window controller in accordance with respective depths of the windows; col. 127, lines 13-18); (col. 43, lines 25-40; col. 113, lines 41-67; col. 114, lines 1-20). Cottle teaches an on screen display controller (OSD) that determines which display is viewable through attributes (window data); (col. 7, lines 59-60; col. 47, lines 25-35; col. 48, lines 3-8, 66-67; col. 49, lines 1-10).

Cottle teaches transmission of header packets containing data describing windows (col. 24, lines 23-30; col. 74, lines 20-28). Cottle teaches blending graphics images using a blend factor (col. 114, lines 44-49; col. 124, lines 55-67; col. 125, lines 34-36).

Cottle does not specifically teach blending graphic images using alpha values associated with the graphics images. However, Dye discloses a system and method for simultaneously displaying a plurality of video data objects having different bit per pixel formats. Dye teaches a graphics controller that manipulates object information workspace memory areas corresponding to each object or window; the workspace areas specifying data types, color depths, depth values, alpha blending information, screen position, etc for each respective window or object on the screen (abstract; col. 5, lines 1-29). Dye teaches alpha blending and alpha values associated with the graphics images (col. 28, lines 4-17; col. 34, lines 22-39; col. 35, lines 5-20). Therefore, it would have been obvious to one ordinarily skilled in the art at the time the invention was made to modify Cottle's invention to include Dye's teaching of blending graphics using alpha values because it enables users to combine at least two colors (pixels, images) allowing for transparency effects in computer graphics.

Claims 2-4 and 12-14:

Cottle teaches data portions describing a corresponding window and sorting the data portions describing windows according to their depth. Dye teaches sorting

data portion in an order from the upper most window to a lower most window; from a left most window to a right most window; from a back most window to a front most window (col. 6, lines 31-42; col. 12, lines 44-60; col. 18, lines 17-32-55; col. 24, lines 65-67; col. 25, lines 1-20; *col. 25, lines 64-67; col. 26, lines 1-20, col. 27, lines 15-45; col. 31, lines 43-65*; col. 33, lines 12-22).

Claims 5 and 15:

Dye teaches sorting data based on which windows have been processed on a current display line (col. 22, lines 10-24; 28-44; col. 31, lines 43-67; col. 32, lines 1-35).

Claims 6 and 16:

Dye teaches a depth number or value associated with each window; the value signifying its respective depth in comparison to other windows (col. 25, lines 28-38; col. 27, lines 15-31, 53-61).

Claims 7 and 17:

Dye teaches modification of the windows' priority (depth number), (col. 5, lines 47-55; col. 29, lines 24-67; col. 30, lines 1-11; col. 31, lines 43-67; col. 32, lines 1-35; col. 33, lines 12-22; col. 42, lines 63-67; col. 43, lines 1-30; col. 53, lines 46-64).

Claims 9 and 19:

Cottle/Dye teaches moving graphics images from memory to the display

engine using direct memory access (Cottle: col. 9, lines 3-18; col. 10, lines 59-65; Dye: col. 3, lines 36-67; col. 11, lines 61-67; col. 12, lines 1-3; col. 15, lines 13-26).

Claims 10 and 20:

Dye teaches converting the graphics images format into a common format (col. 21, lines 43-55; col. 60, lines 30-40).

3. **Claims 8 and 18 are rejected under 35 U.S.C. 103(a) as being unpatentable over *Cottle/Dye* and *Odam et al* (US 5,825,360).**

Claims 8 and 18:

Cottle/Dye does not teach modifying the window's depth number by adding a predetermined value. However, Odam discloses a system and method for arranging windows in a workspace on a computer display screen (abstract; col. 3, lines 10-23). Odam teaches modifying the depth number of a window by adding a predetermined value (col. 7, lines 47-59; col. 8, lines 31-44). Thus, it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify Cottle/Dye's invention to include Odam's teaching of changing a window's depth number by adding a predetermined value because every displayed window has a priority number compared to the other windows being displayed and this number must be increased or decreased once the windows priority changes.

### *Conclusion*

4. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. *Porter* (US 6,208,354 B1) discloses a system and method for storing and displaying multiple graphical images in a mixed video and graphics display. Porter discloses a display overlay engine that reads graphics information stored in memory and blends it with one additional data display source to produce a display output signal. Porter explains that the graphics information fetched from memory includes one or more images, wherein the system determines which image will be fetched based on control information received from a controller. Porter discloses graphics information stored within each image; the graphics information may be stored in a packed or planar format, wherein a packed format combines additional data with the graphics information used in the display; an example is the packing of alpha values for each of the pixels within the graphics image. Porter explains that the alpha value determines the level of translucence of the graphics image with respect to the video information that may be co-resident on the display with the graphics information. *Frank et al* (US 6,384,840 B1) discloses a method and system for displaying overlapping windows on a display screen and displaying and manipulating graphic information. Frank discloses a graphical user interface for displaying a plurality of overlapping windows; a first window having a portion



comprising a graphics image with an alpha value for the pixels set to a value of 1 (traditional window) while the pixels in peripheral areas of the first window have been set to a value less than 1 to achieve transparency. Frank teaches that objects being obscured by the first window are visible because that portion of the window has been rendered transparent through the setting of the alpha value.

*Dilliplane et al* (US 5,940,089) discloses a method and system for displaying multiple windows, having different types of data or different formats, simultaneously, on a display screen. Dilliplane teaches that the system is enabled to perform foreground to background switching on the screen and the displayed windows can be moved and rearranged on the screen (col. 2, lines 1-18, 34-45, 61-67). Dilliplane teaches a display list for pointing to the information to be displayed; the display list having attribute definition fields for defining the type of display information being pointed to by the display list. Dilliplane discloses a system and method for displaying more than one type of data on a display screen, such as displaying digital graphics images in a first window and live video image in a second window, simultaneously on the screen (col. 2, lines 1-67; col. 3, lines 23-38). Dilliplane teaches an attribute list describing the displayed data types and pixel attributes (col. 3, lines 63-67). Dilliplane teaches pixel data stored in memory, defined by a display list entry; and processing the display list entry to obtain display list attributes; and passing the display list attributes and pixel data to a

display controller (col. 4, lines 1-27). Dilliplane teaches color keying for a transparent overlay of one image over a second image (col. 13, lines 7-30).

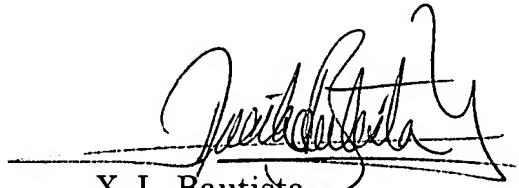
Dilliplane explains that the use of two or more data streams of pixel information is not limited to implementing transparent overlay of an image over a background image, but can also be used to implement alpha blending (alpha value) or translucent blending (col. 13, lines 40-48).

5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to X. L. Bautista whose telephone number is (571) 272-4132. The examiner can normally be reached on Monday-Thursday 8:00AM-6:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Weilun Lo can be reached on (571) 272-4847. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

6. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>.

Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



X. L. Bautista  
Primary Examiner  
Art Unit 2179

xlb  
June 18, 2007